the computational viewpoint. This occurs in the processing unit 12 as now described in connection ~~wih~~ with the flowchart of figure 2. ―

AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions and listings of claims in the application. Please amend the claims, as follows:

1-14. (Canceled)

15. (Currently Amended) ~~The method of claim 14, comprising the steps of:~~ A method of decoding variable-length encoded signals including codewords from a codebook, said codewords having associated respective sets of sign bits, the method comprising:

providing a signed decoding codebook including extended signed codewords, each extended codeword including a respective codeword in said codebook plus the associated sign bit set;

decoding said variable-length encoded codewords by means of said signed decoding codebook, whereby said codewords are decoded together with the sign bit set associated therewith;

defining a threshold value for the length of said codewords, wherein said threshold value partitions said codewords in short and long codewords, respectively; and

decoding at least said short codewords by means of a lookup process against a respective lookup table whose entries are selected to correspond to the extended codewords in said signed decoding codebook.

16.   (Previously Presented) The method of claim 15, wherein said codewords in said codebook have a maximum length, and said threshold value is selected in the vicinity of half said maximum length.

17.   (Currently Amended) ~~the~~ The method of claim 15, comprising the step of decoding said long codewords by means of a multi-step lookup process, said multi-step lookup process comprising:

a first lookup step to a first entry in a first lookup table to retrieve an offset value, and

at least one second lookup step to at least one second entry in at least one second lookup table, said second entry being identified by means of said offset value.

18.   (Previously Presented) The method of claim 17, comprising the step of arranging said first lookup table and said at least one second lookup table as nested lookup tables in a container table.

19.   (Currently Amended) The method of claim 17, wherein said first entry to said first lookup table comprises:

a first field, identifying the ~~codework~~ codeword to be decoded as a short

codeword or a long codeword, respectively;

a second field comprising:

the length of said codeword if said codeword is either of a short codeword

or a long codeword completely decoded, or

said offset value if said codeword is a long codeword still to be partly

decoded; and

a third field including the completely decoded symbols.

20. (Canceled)

21. (Currently Amended) ~~The system of claim 20~~ A system for decoding

variable-length encoded signals including codewords from a codebook, said codewords

having associated respective sets of sign bits, comprising:

at least one memory having stored therein data items defining a signed decoding

codebook including extended signed codewords, each extended codeword including a

respective codeword in said codebook plus the associated sign bit set; and

a processing unit adapted to receive variable-length encoded signals and to

interact with said at least one memory to decode said variable-length encoded

codewords by means of said signed decoding codebook stored in said at least one

memory, whereby said codewords are decoded together with the sign bit set associated

therewith, wherein

said memory comprises stored data items defining a respective lookup table whose entries are selected to correspond to the extended codewords in said signed decoding codebook; and

said processing unit is configured for:

defining a threshold value for the length of said codewords, wherein said threshold value partitions said codewords in short and long codewords, respectively, and

decoding at least said short codewords by means of a lookup process against said respective lookup table.

22.   (Previously Presented) The system of claim 21, wherein said codewords in said codebook have a maximum length and said threshold value is in the vicinity of half said maximum length.

23.   (Previously Presented) The system of claim 21, wherein

said memory comprises stored data items defining:

a first lookup table including a set of entries leading to respective offset values, and

at least one second lookup table including second entries identified by said respective offset values; and

said processing unit is configured for decoding said long codewords by means of a multi-step lookup process, said multi-step lookup process comprising:

a first lookup step to a first entry in said first lookup table to retrieve an offset

value, and

at least a second lookup step to at least a second entry in said at least one

second lookup table, said second entry being identified by means of said offset value.

24.   (Previously Presented) The system of claim 23, wherein said memory is

arranged as a container table including said first lookup table and said at least one

second lookup table as nested lookup tables.

25.   (Previously Presented) The system of claim 23, wherein said first entry to

said first lookup table comprises:

a first field, identifying the codeword to be decoded as a short codeword or a long

codeword, respectively;

a second field comprising:

the length of said codeword if said codeword is either of a short codeword

or a long codeword completely decoded, or

said offset value if said codeword is a long codeword still to be partly

decoded; and

a third field including the completely decoded symbols.

26.   (Currently Amended) A ~~computer program product~~ computer-readable

medium storing instructions for execution by a processor, said instructions capable of

being loadable in ~~the~~ a memory of at least one computer and including software code

portions for performing ~~the~~ a method of <u>decoding variable-length encoded signals</u> <u>including codewords from a codebook, said codewords having associated respective</u> <u>sets of sign bits, the method comprising:</u>

 <u>providing a signed decoding codebook including extended signed codewords,</u> <u>each extended codeword including a respective codeword in said codebook plus the</u> <u>associated sign bit set;</u>

 <u>decoding said variable-length encoded codewords by means of said signed</u> <u>decoding codebook, whereby said codewords are decoded together with the sign bit set</u> <u>associated therewith;</u>

 <u>defining a threshold value for the length of said codewords, wherein said</u> <u>threshold value partitions said codewords in short and long codewords, respectively;</u> <u>and</u>

 <u>decoding at least said short codewords by means of a lookup process against a</u> <u>respective lookup table whose entries are selected to correspond to the extended</u> <u>codewords in said signed decoding codebook.</u> ~~any one of claims 14 to 19.~~